

FIG. 2: Fermi-LAT countmap (200 MeV–10 GeV, Dec. 22, 2010 – Jan. 21, 2011). There is a hint of gamma-ray signal from PSR 1259-63/SS2883 with $TS=5$.

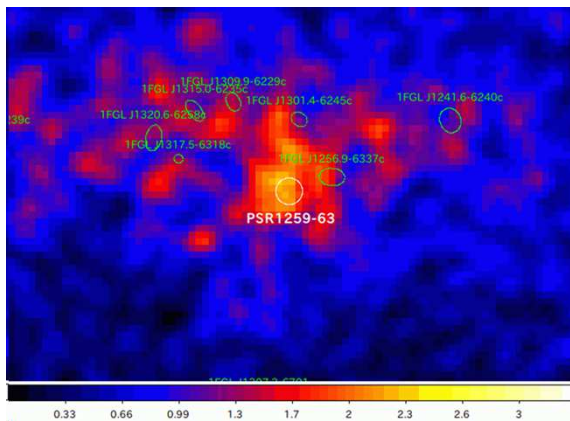


FIG. 3: Fermi-LAT countmap (200 MeV–10 GeV, Jan. 21, 2011 – Feb. 9, 2011). Gamma-ray signal from PSR 1259-63/SS2883 is significant with $TS=58$.

between the pulsar and the Be star [6]. The general tendency of the observed light curve is not inconsistent with prediction.

IV. DISCUSSION

We found a significant GeV gamma-ray signal from this system between 30 days and 65 days after the periastron. Emission in this epoch should be related to the time-varying geometry of this system. We will compare the gamma-ray light curves and spectra with simulation [6] to understand the emission from this binary system.

After the analysis presented here has been com-

pleted, we found similar results from *Fermi*-LAT data have been reported [7, 8].

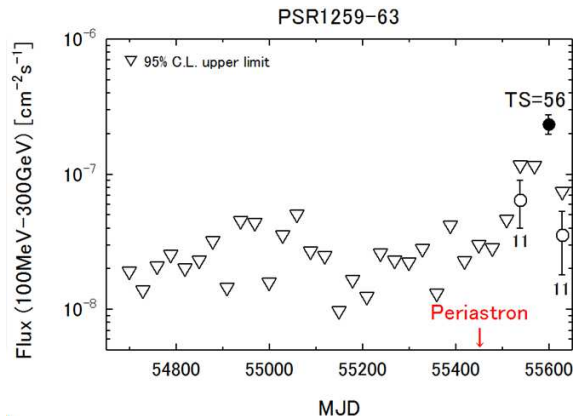


FIG. 4: 30-day-bin light curve. Positive detection is observed only after the periastron. Open circles are fluxes with marginal significance ($\sim 3\sigma$).

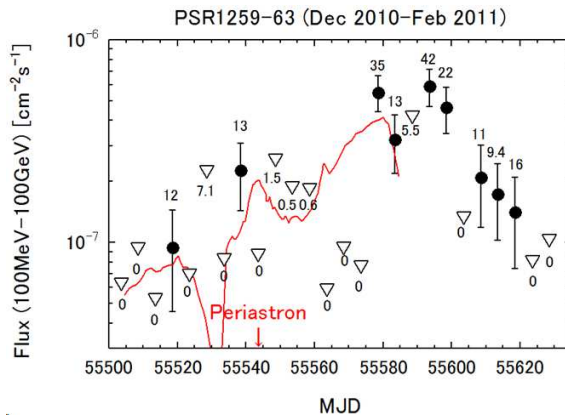


FIG. 5: Close-up of light curve in 5-day bins around periastron. Points are plotted including marginal detections ($9 < TS < 25$). TS values of each point is shown by numbers. Also shown by red lines are the preliminary light curves calculated by SPH simulation of interaction between the pulsar and the Be star assuming realistic parameters of the system [6] scaled arbitrarily.

Acknowledgments

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